

Claims

[1] A plasma processing apparatus, comprising:
gas supply means for supplying a gas including
a reactant gas to an interior of a chamber;
pressure control means for controlling an
internal pressure of the chamber;
plasma generation means for generating a plasma
of the gas in the interior of the chamber; and
a susceptor, installed in a lower portion of the
interior of the chamber, for supporting a substrate
to be processed, and
further comprising a wall surface protecting
member, provided in the interior of the chamber, for
preventing adhesion of a plasma processing-associated
product onto an inner wall surface of the chamber.

[2] The plasma processing apparatus according to
claim 1, characterized in that the wall surface
protecting member is an inner cylinder covering the
inner wall surface of the chamber which is located above
the susceptor.

[3] The plasma processing apparatus according to
claim 1 or 2, characterized in that the wall surface
protecting member is supported on the chamber by point
contact.

[4] The plasma processing apparatus according to any one of claims 1 to 3, characterized in that the wall surface protecting member is made of a ceramic.

[5] The plasma processing apparatus according to any one of claims 1 to 3, characterized in that the wall surface protecting member is made of a metal.

[6] The plasma processing apparatus according to claim 5, characterized in that the metal is aluminum.

[7] The plasma processing apparatus according to claim 5 or 6, characterized in that the wall surface protecting member has a surface oxidized.

[8] The plasma processing apparatus according to any one of claims 1 to 7, characterized in that the wall surface protecting member has a surface roughened.

[9] The plasma processing apparatus according to any one of claims 1 to 8, characterized in that the gas supply means is installed while passing through a hole provided in the wall surface protecting member.

[10] The plasma processing apparatus according to any one of claims 1 to 9, characterized in that a heat

insulator is provided between the wall surface protecting member and the chamber.

[11] The plasma processing apparatus according to any one of claims 1 to 10, further comprising heating means for heating a wall surface of the chamber.

[12] The plasma processing apparatus according to claim 11, characterized in that the heating means heats the wall surface of the chamber to 100°C or higher.